Listing of Claims:

No claim amendments are being presented at this time. This listing of claims is provided merely for convenience, and will replace all prior versions and listings of claims in the application.

1. (Previously presented) A spin-stand comprising:

a rotary actuator arm which supports a transducer head adjacent a data storage medium;

an encoder which determines an angular position of the actuator arm; and

a control circuit which translates the angular position from the encoder to a radial position of the head with respect to the medium.

2. (Previously presented) The spin-stand of claim 1 wherein the actuator arm is rotated by a Halbach array voice coil motor.

3. (Previously presented) The spin-stand of claim 1 further comprising:

a preamp board operably attached to the rotary actuator arm to amplify read signals received from the transducer head;

a mounting tool extending from the rotary actuator arm to support the transducer head on ~~an~~ a head gimbal assembly relative to the data storage disc; and

an encoder plate attached to the rotary actuator arm and being operably coupled to the encoder to determine the angular position of the rotary actuator arm.

Claim 4 (cancelled).

5. (Previously presented) The spin-stand of claim 1 further comprising a demodulator connected to the preamp to generate from servo data read from the data storage medium a track identifier specifying an identified track on the medium and a position error signal characterizing an offset of the transducer head relative to the identified track.

6. (Previously presented) The spin-stand of claim 5 wherein the control circuit further adjusts control current to a motor coupled to the actuator arm in accordance with the position error signal, if the position error signal and track identifier are consistent with the angular position determined by the encoder.

7. (Previously presented) The spin-stand of claim 5 wherein the control circuit further bypasses adjustment of control current to a motor coupled to the actuator arm in accordance with the position error signal, if the position error signal and track identifier are not consistent with the angular position determined by the encoder.

8. (Previously presented) The spin-stand of claim 5 wherein the control circuit further adjusts control current to a motor coupled to the actuator arm in accordance with the angular position determined by the encoder, if the position error signal and track identifier do not agree with the angular position.

9. (Previously presented) The spin-stand of claim 1 wherein the control circuit further evaluates servo data transduced by the head from a track on the medium and the angular position determined by the encoder to generate a position error signal adjustment parameter to redefine the track as substantially circular.

Claim 10 (cancelled).

11. (Previously presented) A method comprising:

transducing servo data from a data storage medium using a transducer head supported adjacent the medium by a rotary actuator arm;

detecting an angular position of the actuator arm; and

bypassing adjustment of control current to a motor coupled to the actuator arm in accordance with the transduced servo data if said servo data are not consistent with the detected angular position of the actuator arm.

Claims 12-16 (cancelled).

17. (Previously presented) The method of claim 11 wherein the transducing step comprises transducing the servo data from a track on the medium, and wherein the method further comprises evaluating the servo data and detected angular position to generate a position error signal adjustment parameter, thereby redefining the track as substantially circular.

Claim 18 (cancelled).

19. (currently amended) The method of claim 11 further comprising adjusting control current to the motor in accordance with the detected angular position, if the servo data are not consistent with the detected angular position.

Claims 20-24 (cancelled).

25. (Previously presented) The method of claim 11 further comprising translating the detected angular position to a radial position of the head with respect to the medium.

26. (Previously presented) The method of claim 11 wherein the motor of the bypassing step is characterized as a Halbach array voice coil motor.

27. (Previously presented) The method of claim 11 wherein the transducing step comprises generating, from the servo data, a track identifier specifying an identified track on the medium and a position error signal characterizing an offset of the transducer head relative to the identified track.

28. (Previously presented) The method of claim 11 further comprising adjusting control current to the motor in accordance with the transduced servo data, if the transduced servo data are consistent with the detected angular position of the actuator arm.

29. (Previously presented) A spin-stand comprising a rotary actuator arm which supports a transducer head adjacent a data storage medium, and a Halbach array voice coil motor configured to move the actuator arm with respect to the medium.

30. (Previously presented) The spin-stand of claim 29, further comprising an encoder which determines an angular position of the actuator arm.

31. (Previously presented) The spin-stand of claim 30, further comprising a control circuit which selectively applies control current to the motor to position the transducer head adjacent the medium in relation to the determined angular position and servo data transduced by the head from the medium.

32. (Previously presented) The spin-stand of claim 31, wherein the control circuit further generates a position error signal adjustment parameter in relation to the determined angular position and the transduced servo data to define a substantially circular track on the medium.